



UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office

Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
-----------------	-------------	----------------------	---------------------

08/650,709 05/20/96 ALBIN

D 7693-002-0

022850 QM12/0705
OBLON SPIVAK MCCLELLAND MAIER & NEUSTADT
FOURTH FLOOR
1755 JEFFERSON DAVIS HIGHWAY
ARLINGTON VA 22202

EXAMINER

DEXTER, C

ART UNIT

PAPER NUMBER

3724

DATE MAILED:

07/05/01

Please find below and/or attached an Office communication concerning this application or proceeding.

Commissioner of Patents and Trademarks

Office Action Summary

Application No.
08/650,709

Applicant(s)
Albin et al.

Examiner
Clark F. Dexter

Art Unit
3724



-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on Apr 17, 2001
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 2, 12, 13, 17-19, 21, 22, 26, and 27 is/are pending in the application.
- 4a) Of the above, claim(s) 2, 12, 13, and 18 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 17, 19, 21, 22, 26, and 27 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claims _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are objected to by the Examiner.
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

- 13) ☒ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).
- a) ☐ All b) ☐ Some* c) ☒ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- *See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

- 15) ☐ Notice of References Cited (PTO-892)
- 16) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 17) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____
- 18) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 19) ☐ Notice of Informal Patent Application (PTO-152)
- 20) ☐ Other: _____

Art Unit: 3724

DETAILED ACTION

1. The amendment filed April 17, 2001 has been entered.

Drawings

2. The drawings stand objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the “depressions” as set forth in claim 27 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered. As previously stated, the addition of new Figure 5 stands as being **disapproved** because, as previously stated in paragraph 5 of paper #28, applicants did not provide a basis in the original disclosure for the specific configuration of the back-up roll notches or did not state that such a back-up roll configuration is old and well known in the art. Thus, applicant must either provide a basis found in the original disclosure for the specific back-up roll notch configuration or state that such a configuration is old and well known in the art.

Claim Rejections - 35 USC § 112, 2nd paragraph

3. Claims 17, 19, 21, 22, 26 and 27 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 26, line 10, “sufficiently less” is vague as to what constitutes “sufficiently”.

Art Unit: 3724

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103© and potential 35 U.S.C. 102(f) or (g) prior art under 35 U.S.C. 103(a).

"103" Rejections Based on Heywood

5. Claims 17-19 and 26, as understood, are rejected under 35 U.S.C. 103(a) as being unpatentable over Heywood in view of Williams.

Heywood discloses a device, particularly in Figures 1-4, with almost every structural limitation of the claimed invention including a cutting roll (F or G-G') with axially extending cross-cutting elements (e.g., "e") and radially extending longitudinal cutting elements (e.g., "c" or "d" or "T"), and a back-up roll © which is approximately parallel to the cutting roll. However, Heywood lacks a conveying device that is driven separately from the cutting roll. However, the Examiner takes Official notice that it is old and well known in the art to provide conveyors to move material from one work station (i.e., from storage, from a queue station, or from another

Art Unit: 3724

processing apparatus) to another by independently driven conveyors to gain the benefits of automated operation (such as reduction of manpower) as well as the well known benefits of conveying devices such as efficient and continuous movement of material. For example, Williams discloses a conveying device (e.g., carrier belt 5) which is separately driven from the cutting device and is used to move the material onto another conveyor (e.g., carrier 3) for cutting thereof. As is well known in the art, these conveyors can be driven at any desired speed to provide a desired spacing of the material during the material processing (i.e., the speed at which material moves from one apparatus to the next is often different than that of the material through any one of the apparatus). Therefore, it would have been obvious to one having ordinary skill in the art to provide separately-driven conveyors to feed material to or from the device of Heywood, for example, an infeed conveyor to move material onto the conveyor (e.g., L) of Heywood, for the well known benefits including those described above and further including those taught by Williams. Further, it would have been obvious to operate such an infeed conveyor at a speed higher than that of the conveyor and cutting roller of Heywood to decrease the spacing between the work pieces, or to operate such an infeed conveyor at a speed less than that of the conveyor and cutting roller of Heywood to increase the spacing between work pieces as is well known in the art.

Regarding claim 17, Heywood discloses flat cross cutters but lacks a disclosure that the cross cutters are formed of flat steel polished on one side. However, the Examiner takes Official notice that it is old and well known in the art to provide cutting blades made of polished steel to

Art Unit: 3724

keep the blades free of contaminants and to provide a blade having a cleaner appearance.

Therefore, it would have been obvious to one having ordinary skill in the art to make the blades, including the cross cutters, of Heywood of polished steel for the well known reasons including those described above.

6. Claims 21, 22 and 27, as understood, are rejected under 35 U.S.C. 103(a) as being unpatentable over Heywood as applied to claim 26 above, and further in view of Stream.

Heywood lacks the back-up roll being coated with plastic and further lacks depressions in the surface of the back-up roll. However, Heywood discloses that the back-up roll is covered with a soft material, specifically "rawhide or any other suitable material". Further, it is old and well known in the art to provide plastic on an anvil or back-up roll as evidenced by Stream to enable the blade to press through the workpiece with sufficient pressure to cut the workpiece while not dulling the cutting edge of the blade. Plastic coating is clearly a modern alternative to a rawhide coating, and the specific types of plastic set forth are common forms of plastic. Further, the plastic coating of Stream forms depressions to receive the cutting edges of the blades of the cutter roller and Stream teaches that this establishes a strong traction between the cutter roll and the back-up roll and further prevents wear of the backup roll. Therefore, it would have been obvious to one having ordinary skill in the art to replace the rawhide coating with plastic, particularly the notched coating of Stream, to gain the well known advantages of plastic including increased durability and reduced manufacturing costs as well as the advantages taught by Stream.

Art Unit: 3724

Further, one having ordinary skill in the art would clearly select a common form of plastic for the well known benefits including availability.

"103" Rejections Based on Leeper et al.

7. Claims 17, 19 and 26, as understood, are rejected under 35 U.S.C. 103(a) as being unpatentable over Leeper et al. in view of Anetsberger.

Leeper et al. discloses a device with almost every structural limitation of the claimed invention including a cutting roll (e.g., 31) having at least one axially extending cross cutting element (e.g., 32) which includes a cutting edge and which is arranged parallel to a longitudinal axis of the cutting roll; a back-up roll (e.g., 72); and a conveying device (e.g., 12, 13) driven at a speed sufficiently less than the circumferential speed of the cutting roll (e.g., see col. 2, lines 61-67). Leeper et al. lacks a circumferentially extending cutting element. However, cutting rolls having both axially extending cross cutting elements and circumferentially extending cutting elements are old and well known in the art as evidenced by Anetsberger for longitudinally and laterally cutting a work piece to a desired size. Therefore, it would have been obvious to one having ordinary skill in the art to provide one or more circumferentially extending cutting elements on the cutting roll of Leeper et al. to further longitudinally divide the work piece as is well known in the art.

Regarding claim 17, Leeper et al. discloses flat cross cutters but lacks a disclosure that the cross cutters are formed of flat steel polished on one side. However, the Examiner takes Official

Art Unit: 3724

notice that it is old and well known in the art to provide cutting blades made of polished steel to keep the blades free of contaminants and to provide a blade having a cleaner appearance.

Therefore, it would have been obvious to one having ordinary skill in the art to make the blades, including the cross cutters, of Leeper et al. of polished steel for the well known reasons including those described above.

8. Claims 21, 22 and 27, as understood, are rejected under 35 U.S.C. 103(a) as being unpatentable over the combination of Leeper et al. In view of Anetsberger as applied to claim 26 above, and further in view of Stream.

The combination lacks the back-up roll being coated with plastic and further lacks depressions in the surface of the back-up roll. However, the Examiner takes Official notice that it is old and well known in the art to provide plastic on an anvil or back-up roll as evidenced by Stream to enable the blade to press through the workpiece with sufficient pressure to cut the workpiece while not dulling the cutting edge of the blade. Plastic coating is clearly a modern coating for back-up rolls, and the specific types of plastic set forth are common forms of plastic. Further, the plastic coating of Stream forms depressions to receive the cutting edges of the blades of the cutter roller and Stream teaches that this establishes a strong traction between the cutter roll and the back-up roll and further prevents wear of the backup roll. Therefore, it would have been obvious to one having ordinary skill in the art to provide a plastic coating on the back-up roll of Leeper et al., particularly the notched coating of Stream, to gain the well known advantages of

Art Unit: 3724

plastic including increased durability and reduced manufacturing costs as well as the advantages taught by Stream. Further, one having ordinary skill in the art would clearly select a common form of plastic for the well known benefits including availability.

Response to Arguments

1. Applicant's arguments filed April 17, 2001 have been fully considered but they are not persuasive.

In the paragraph bridging pages 2 and 3 of the response, applicant argues that the “[T]he additional conveyor of Williams, if positioned upstream of the conveyor L of Heywood, would not convey a material to the nip between the rolls F and C of Heywood, but would only convey the material to the conveyor L, and so cannot satisfy this claim limitation.” The Examiner respectfully disagrees with applicant’s analysis and submits that applicant is unduly narrowly interpreting the subject claim limitation. The only structural requirements for the conveyor that are set forth in the claim are that the conveyor is disposed upstream of the nip and is driven at a speed which is less than the circumferential speed of the cutting roll. There is no requirement that the conveyor extend to the nip, only that it conveys material to the nip. Clearly, a conveyor which conveys material onto the conveyor L of Heywood is at least in part conveying a material to the nip of Heywood. The Examiner’s position is that Williams teaches providing an independently-driven conveyor which moves a material in a desired direction (e.g., onto another conveyor).

Art Unit: 3724

In the paragraph bridging pages 4 and 5 of the response, applicant argues that “the licorice cutter of Leeper et al. has no need for circumferentially extending cutting elements in order to cut strips of licorice into pieces. So those skilled in the art would not have been motivated to have modified Leeper et al. to include the circumferentially extending cutting elements of Anetsberger, since they would not contribute to cutting the strips of Leeper et al.” The Examiner respectfully disagrees. Clearly, it would have been obvious to one having ordinary skill in the art to provide circumferentially extending cutting elements such as those taught by Anetsberger to the cutting device of Leeper et al. to longitudinally subdivide (or further subdivide) the strips of Leeper et al. and thus such a modification would be well within the skill level of one having ordinary skill in the art.

At the bottom of page 5 of the response, applicant argues that the meaning of “sufficiently less” is defined in the claim itself as sufficiently less “to avoid congestion.” The Examiner respectfully submits that the claim limitation remains unclear, particularly since such a limitation relies on the type of workpiece being cut, and such a workpiece is not part of the claimed invention. Thus, the structure being implied by such a limitation (e.g., how much less) is unclear and thus renders the limitation vague and indefinite. It is respectfully suggested to simply delete “sufficiently” to obviate this rejection.

On page 6 of the response, applicant argues that proposed Figure 5 shows nothing more than what is being claimed. The Examiner respectfully disagrees. Again, proposed Figure 5 does not show notches in the surface of a back-up roll as described in the specification on page 12

Art Unit: 3724

(line 11). Rather, proposed Figure 5 shows a roller with a completely jagged surface and there appears to be no basis in the original disclosure for such a figure.

Conclusion

2. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Clark Dexter whose telephone number is (703) 308-1404.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Rinaldi Rada, can be reached at (703)308-2187.

Art Unit: 3724

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703)308-1148. The fax numbers for this group are: formal papers - (703)305-3579; informal/draft papers - (703)305-9835.



Clark F. Dexter
Primary Examiner
Art Unit 3724

cfd
June 29, 2001